



THE RARA RAG

Newsletter of The Rochester Amateur Radio Association, Inc.

Founded in 1931

JUNE 2024
VOLUME 78, ISSUE 9

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JUNE MEETING - CRUISE NIGHT

TIM BARRETT, K9VB, RARA VICE PRESIDENT

We're bringing back cruise night!

What: A cruise night as an informal June meeting. Bring your vehicle with a mobile installation, or just any interesting car – classic or new. Of course you're welcome even if you're not bringing a car. Come socialize and look around.

We'll have at least one drawing for the best mobile installation. The winner will have their dinner paid for (Up to \$20). If we have a lot of participants, we may also draw prizes for best mobile HF, and best car.

Date: To keep in line with our normal meetings, the event will be Wednesday June 5th. If the weather looks bad, we'll put a rain delay on the website, Facebook, and groups.io until the following Wednesday June 12th.

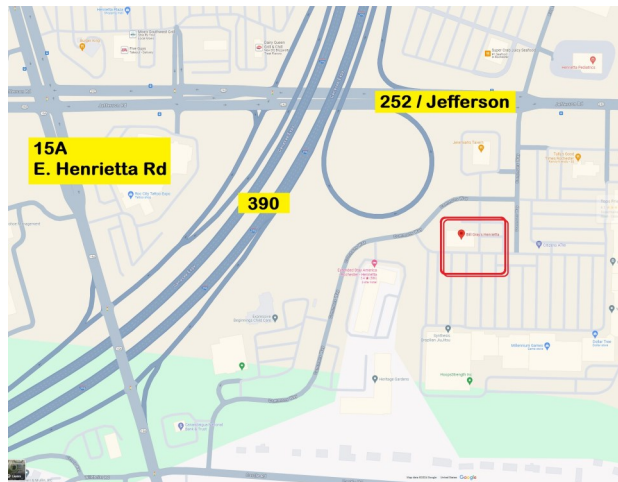
Time: Since the intent is for people to be able to eat, we're moving the meeting up a bit. We suggest people arrive between 5:30 and 6:00pm. Since the prize is related to dinner we're going to try to draw the winner(s) around 6:15 or a little after, so arrive on time for your chance to win!

Location: Bill Gray's Henrietta at 1225 Jefferson Rd, Rochester, NY 14623. Look for the RARA feather flag and an area with some orange cones.



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K2JD



N2EH



W2EOC

BOARDZ BUZZ

DAVE WILSON, WA2HOY, DIRECTOR

Summer is here at last, and with the warmer weather we can take our ham radio activities outside.

For a lot of folks one of the main events for summer is Field Day. It's a great chance to get together with members of this or one of the other ham radio clubs, head out to one of the parks, or your backyard. It's great practice for those skills needed during those power outages, or the cell towers are down. But most of all, it's a great way to have fun.

Another great thing about summer is that it's hamfest season. While unfortunately RARRA won't be having its hamfest this year, there are still plenty of other opportunities to find that new bit of gear, or new to you, at least. The RocCity Hamfest has been a great hamfest in years past. Editor's note: see page 5, "Upcoming Events" for a list of hamfests in Western NY.

How about your antennas? With the weather on our side for a while, it's a great time to check and make sure they're in good working order. Once you've checked them and taken care of any issues or find that everything is okay, how about putting up a new antenna? It doesn't have to be anything complicated, a simple dipole for HF or a J-Pole for VHF. There are plenty of guides on the web, books new and used, YouTube videos for showing how to roll your own.

Maybe consider helping at one of the public service events this season. This is a great way to practice those skills needed for when there is a weather or other emergency, and a great way to give back to the community.

Have you been active in Parks on the Air from home? If you have the mobile gear, you might try activating a park.

All in all, whatever you decide to do this summer, I hope everyone will have a great time.

CALENDAR OF EVENTS

WEDNESDAY JUNE 5, 2024 - INFORMAL "MONTHLY MEETING," "CRUISE NIGHT." BILL GRAYS, 1225 JEFFERSON RD, ROCHESTER 14623.
IN CASE OF RAIN THE MEETING WILL BE WEDNESDAY JUNE 12.
5:30 PM IN PERSON ONLY

SATURDAY JUNE 8, 2024 - RARRA WILL HAVE A BOOTH AT THE
ADIRONDACK MOUNTAIN CLUB EXPO," MENDON PONDS PARK,
9:30 AM TO 3:30 PM

SATURDAY JUNE 8, 2024 - FINGER LAKES TOUR DE CURE, FINGER
LAKES COMMUNITY COLLEGE, CANANDAIGUA, NY

Saturday Jul 27, 2024 - RARRA Summer Picnic at Stewart Lodge in
Mendon Ponds Park. Set up at 10:00 AM, picnic starts at
11:00 AM

RARA MEMBERSHIP NEWS

TIM BARRETT, K9VB, RARA VICE PRESIDENT AND MEMBERSHIP SECRETARY

Membership of RARA now stands at 419, that's an increase of 9 since last month, seven renewals and two new members. Great to still see people renewing but we are still behind the 534 members we had at this time last year.

Now is the time to renew if you have not already done so and are not a life member! Thanks to all who have already renewed.

If your membership has lapsed, please renew your membership!

You can join by clicking [here](#) or renew your membership [here](#).

There are many membership benefits, here are just some of them:

- Only members can attend the RARA Annual Auction
- Free admission to the RARA Hamfest
- Access to license classes and discounts for license manuals
- Annual events such as the Picnic and Winterfest
- Earn Membership Points for contributing/volunteering at Club Events.
- Redeem Membership Points for annual dues and other activities
- Supporting an Organization that you value!

Being a member is also important, as your dues and a healthy membership count contribute to many RARA activities such as Rag subscription, monthly meetings, RARA Academy sessions Elmer's Corner, [groups.io](#) mailing list, Facebook page, etc. Attracting good speakers is greatly helped when we can point to the size of our club, one of the largest ARRL affiliated clubs by the way.



To remind you all, the software package we use to manage membership is very old and missing features that we would like to see. One of its limitations is that it stores in plain text the access code you use to get to your information from our website. That means the support team (both of us!) can see the code, so don't use your secret password or confidential information.

I'd like to give a warm welcome to our two new members Vincent Micciche and James Baker, KE2BMT

Remember to look out for new members at RARA events and make sure to introduce yourself and welcome them to the club!

Get Your RARA Merch at Cafepress®



Tees, Hooded Sweatshirts, Caps and More!

www.cafepress.com/rararadio

RArA ANNUAL PICNIC IS ON SATURDAY JULY 27TH

TIM BARRETT, K9VB, RArA VICE PRESIDENT AND MEMBERSHIP SECRETARY

Please join us at the annual RArA picnic! It will be held at the Stewart Lodge in Mendon Ponds Park on Saturday, 27th July from 11:00AM to 2:00PM. This is always a great occasion and an opportunity to enjoy good food, good company and play with radios! You are welcome to set up your own rig, or to explore what others have set up.

As usual we will be cooking burgers and hots and will also provide cold drinks. We are also inviting everyone to bring a dessert to share. Set up will start around 10:00AM, and the grills will be ready by noon. You are of course welcome to get there early to enjoy the day and each other's company. Hoping to see you there!



UPCOMING EVENTS

BRIAN O'CONNOR, KA2CGB, TREASURER

This summer will include many opportunities for you to be out and about with RARA:

June 8: RARA will have a booth at the Adirondack Mountain Club (ADK) Outdoor Expo in Mendon Ponds Park on June 8, where we will inform and demonstrate Ham Radio to visitors.

June 8: The Tour de Cure is the premier fundraising campaign of the American Diabetes Association. The Rochester area's tour has been one of their most successful bike-a-thons. This year's event will be based out of the Finger Lakes Community College. Amateur operators using 2m radio will provide rider support and safety communications along the route from Canandaigua to Naples, Geneva, and return.

June 22-23: ARRL Field Day. Details of area club deployments will appear in the June edition of the RARA Rag.

July 27: RARA Summer Picnic at Stewart Lodge in Mendon Ponds Park

August 10: The MS ROC Great Lakes Adventure benefits the Multiple Sclerosis Society. This fundraising event will begin and end at Lakeside Beach State Park extending west toward Olcott. Orleans County OCARC will be leading this activity.

August 10: We have been asked to provide operational and safety communications for the Mammoth March, which is a rigorous 20-mile, 8-hour hike around Letchworth Park. Because of the topography, we may need to be creative with multiple repeaters, cross band and maybe even 6 meters or HF. We plan supporting HQ (start/finish) along with four (4) on-trail aid/water stations as well as mobile support by sweep and shuttle crews.

August 17-18: Join us at the Charlotte-Genesee Lighthouse for the International Lighthouse Lightship Weekend (ILLW). This should be a great year to make HF QSOs with individual Hams as well as other ILLW stations.

September 21: RARA will again provide operational and safety communications for the Fairport Lift Bridge Regatta.

Hamfests in Western New York

June 8: Cortland Hamfest, Cortland County Fairgrounds:
https://skylinehamradioclub.org/?page_id=76

June 8: Lockport LARA Hamfest, Cambria Volunteer Fire Dept., Lockport N.Y.:
<https://www.lockportara.us/>

July 13: RAGS Hamfest, Radio Amateurs of Greater Syracuse, Camillus Elks Club: <https://ragsclub.org/ham-fest/>

July 20: Batavia Hamfest, Lancaster Amateur Radio Club, Alexander NY:
<https://w2so.org/batavia-hamfest/>

August 17: KLARA Hamfest, Hornell NY: <http://klara.us>

August 24: ROC City Net Hamfest in Macedon:
<http://roccitynethamfest.com/>

Several more Hamfests will be held in September. For a current listing see <https://www.upstateham.com/p/2014-upstate-hamfests-that-i-have-heard.html>



EDUCATION

Karl Heinz Kremer, K5KHK, Education Coordinator

RARA LICENSE COURSES

Karl Heinz Kremer, K5KHK, License Class Coordinator

License Classes

If you missed our last round of classes, please let us know that you are interested, and we will put you on the list for the next session. The April VE session was our last one until September. Keep in mind that there are other testing opportunities in the area: Spring and summer is the season of hamfests, and a lot of hamfests do offer VE testing.

New General Question Pool

Since July 1st, 2023 all General license exams are now using the new question pool, which means that you need the 10th edition of the ARRL License Manual to study for the test. Make sure you have the correct edition. Even though this book is almost brand new, it already is out of date – the FCC changed the data rate limitations on the HF bands to a bandwidth restriction. In general, you can find the questions in all three question pools that have been withdrawn listed on this page: <http://www.arrl.org/withdrawn-questions>.

New Amateur Extra Question Pool

We are in the last few months of the current Amateur Extra question pool, starting on July 1st, we will have a new question pool, and with that will also come a new license manual. The ARRL has not yet released the new book, as soon as it is available, we will have a few in stock.

License Manuals

The current editions of the Technician and General license manuals are available to our members at a discount for \$25. At this discount, we unfortunately can

not deliver, and you would have to pick up the manual. If you are interested, please send an email to education@rochesterham.org

The Amateur Extra license manual will expire at the end of June 2024, because of that, we do not want to keep any stock that we might not be able to sell, but we can order a book for you for the same price as our other license manuals.

I usually have some license manuals with me at official RARA events (e.g. the monthly meetings).

RARA ACADEMY

If you have anything you would like to teach in a RARA Academy, please let us know. Even if it's something shorter, we can combine your topic with something else to fill the two-hour time slot that we usually aim for.

We are still looking for input in what our next Academy session should cover. To make it easy for our members to provide such input, we created an online survey. Please go to <http://tiny.cc/RaRaAcademySurvey2022> and fill out the survey. If this short link should not work, you can also use this link: https://docs.google.com/forms/d/e/1FAIpQLSfe_RvJyAfc2BidWxePLvK1r_CjQosS1PV0Ua6m2zETiyPa-w/viewform

And we are again looking for a volunteer to organize our RARA Academy sessions. This is a position for which you don't have to be an expert in anything as long as you are **good at organizing things**, and you will get a front row seat for all Academy presentations. If you are interested in joining our education team, please let us know.

RARA ELMERS' CORNER

Suzanne Bishopp, W2SUZ

Rich Bishopp, KD2UBJ

Elmers' Corner Coordinators

It was great seeing everyone at our hands on Academy in May. But let's get back to Zoom, at least 1 more time before we break for the summer.

June 1st at 10 am...The first Saturday of the month is the first DAY of the month! Join us to talk radio. We will answer any questions you may have and if you have any follow-ups from the academy, this is your place to get those answers. Remember, just because we won't be doing Zoom meetings during the summer, doesn't mean we can't help you. We will always be around to answer any questions you have.

For our June meeting, if you have any questions that you would like us to be prepared to answer at our next zoom meeting, please email them to us at elmerscorner@rochesterham.org

ELMERS' CORNER

Next Zoom Meetings:

June 1st 10am

September 7th

Join Zoom Meeting

[https://us02web.zoom.us/j/83484674667?](https://us02web.zoom.us/j/83484674667?pwd=MG5DZXd6SFovN3lXa0NNTzM5UnBLUT09)

[pwd=MG5DZXd6SFovN3lXa0NNTzM5UnBLUT09](https://us02web.zoom.us/j/83484674667?pwd=MG5DZXd6SFovN3lXa0NNTzM5UnBLUT09)

Meeting ID: 834 8467 4667

Passcode:786545

One tap mobile

+16465588656,,83484674667#,,,,*786545# US (New York)

+13126266799,,83484674667#,,,,*786545# US (Chicago)

Dial by your location

+1 646 558 8656 US (New York)

+1 312 626 6799 US (Chicago)

+1 301 715 8592 US (Washington DC)

+1 253 215 8782 US (Tacoma)

+1 346 248 7799 US (Houston)

+1 669 900 9128 US (San Jose)

Find your local number: <https://us02web.zoom.us/j/kiOoVkCMY>

Suzanne – W2SUZ

Rich – KD2UBJ

MORSE CODE TRAINING

Dave Wilson, WA2HOY, RXCWG Coordinator

The RXCW Group assists Hams wanting to learn Morse Code or to develop their CW skills.

BEGINNERS MORSE CODE ZOOM CLASSES

LOOKING FOR A NEW BEGINNER'S MORSE CODE ELMER

To all CW Elmers, Pete Fournia, W2SKY, has stepped down as instructor for the Beginner's Morse Code Class. If you would like to take over this class and help folks get started in CW, please get in touch with me, Dave, WA2HOY, or Karl Heinz, K5KHK.

MORSE PRACTICE FOR ALL LEVELS ON ZOOM AND ON THE AIR

Tim Brown, WB2PAY, hosts Zoom code practice for all levels on Thursday evenings at 7:30pm. For On Air schedules contact Tim at:

tjbrown@rochester.rr.com

RXCWG INTERMEDIATE CW PRACTICE- 7:30pm Thursdays

Join Zoom Meeting

[https://us04web.zoom.us/j/79966212852?](https://us04web.zoom.us/j/79966212852?pwd=M0M1MIBmVTJkWWl0RjRlYXlhc3pOUT09)

[pwd=M0M1MIBmVTJkWWl0RjRlYXlhc3pOUT09](https://us04web.zoom.us/j/79966212852?pwd=M0M1MIBmVTJkWWl0RjRlYXlhc3pOUT09)

Meeting ID: 799 6621 2852

Passcode: tpjz8e

W1AW On The Air CW Practice

<http://www.arrl.org/w1aw-operating-schedule>

Time	Mon	Tue	Wed	Thu	Fri
9 AM		Fast	Slow	Fast	Slow
4 PM	Fast	Slow	Fast	Slow	Fast
7 PM	Slow	Fast	Slow	Fast	Slow
10 PM	Fast	Slow	Fast	Slow	Fast

SLOW - 5, 7 1/2, 10, 13 and 15 wpm

FAST - 35, 30, 25, 20, 15, 13 and 10 wpm

FREQ(MHz) - 1.8025, 3.5815, 7.0475, 14.0475, 18.0975, 21.0675, 28.0675, 50.350, 147.555

RADIO ELMERS

Name	Call	Area	Email
Tim Brown	WB2PAY	Ogden	tjbrown@rochester.rr.com
Dave Carlson	N2OA	Batavia	kdcarlso@gmail.com
Lawrence Hill	N2AJX	Henrietta	lawrence.hill@rit.edu
Rich Hoffarth	K2AXP		rhoffarth2000@yahoo.com
Bill Kasperkoski	WB2SXY	Pittsford	wb2sxy@gmail.com
Don Kiser	AC2EV	N Greece	dkiser100@gmail.com
Karl Heinz Kremer	K5KHK	Chili	k5khk@khk.net
Tim Magee	WB2KAO	Greece	585-704-5747
Mike Moore	KC2NM		mikemoore@ieee.org
Peter Schuch	WB2UAQ	Perinton	pschuch@rochester.rr.com
Forest Shick	WA2MZG	Webster	fshick3@gmail.com
Dave Timmons	W2DST	N Greece	dstimmons@gmail.com
Steve Verzulli	KA1CNF		verzulli@yahoo.com
Dan Waterstraat	W2DEW	Henrietta	higreen@rochester.rr.com

CW ELMERS

Name	Call	Area	Email
Ned Asam	W2NED	Pittsford	w2ned@frontiernet.net
Tim Brown	WB2PAY	Ogden	tjbrown@rochester.rr.com
Pete Fournia	W2SKY	Penfield	pfournia@gmail.com
Bill Hopkins	AA2YV	Brighton	whopkin4@naz.edu
Bob Karz	K2OID	Webster	rkarz@rochester.rr.com
Joe Rowe	AG2Y	Webster	ag2y@rochester.rr.com
Harry Williams	KF2TV	Kingsland, GA	harryw7872@gmail.com

THE CW QRP PER DAY STREAK- AND SO IT ENDS

KARL HEINZ KREMER, K5KHK

5/13/24	1237	KB9RPG	30m	10,115.5	CW	559	549 IN	[P
5/13/24	1235	KB3EOF	40m	7,060.0	CW	559	559 MD	[P
5/13/24	1205	KB9RPG	40m	7,063.0	CW	559	229 IN	[P
5/12/24	2115	W3PYF	40m	7,028.0	CW	559	599 MA	[P
5/10/24	1451	KL7NL	20m	14,036.0	CW	559	569 NC	[P
5/10/24	1448	AE4GS	20m	14,028.0	CW	579	569 TN	[P

Figure 1: Excerpt from my log with the missing day marked up.

As you may recall from last month's Rag, I set myself a goal of having at least one QRP (low power, for CW this usually means 5W or less) CW contact per day. As many of you were watching the aurora that was caused by what the giant sunspot AR3664 delivered to Earth, I was mourning the end of my "at least one QRP CW QSO per day" streak. On May 11th, 2024, there were many times when I could not detect a single FT8 signal on 40 and 20m. It felt like the bands were just turned off. And because of these solar conditions, I was not able to make a CW contact with QRP power.

I did manage to get one 5W FT8 contact in the log, for CW I had to crank up the power to 50W to make a SKCC WES (Weekend Sprintathon) contact. This means my "at least one CW contact per day at any power level" attempt was still going, but unfortunately, not with QRP power levels.

Here is the culprit:

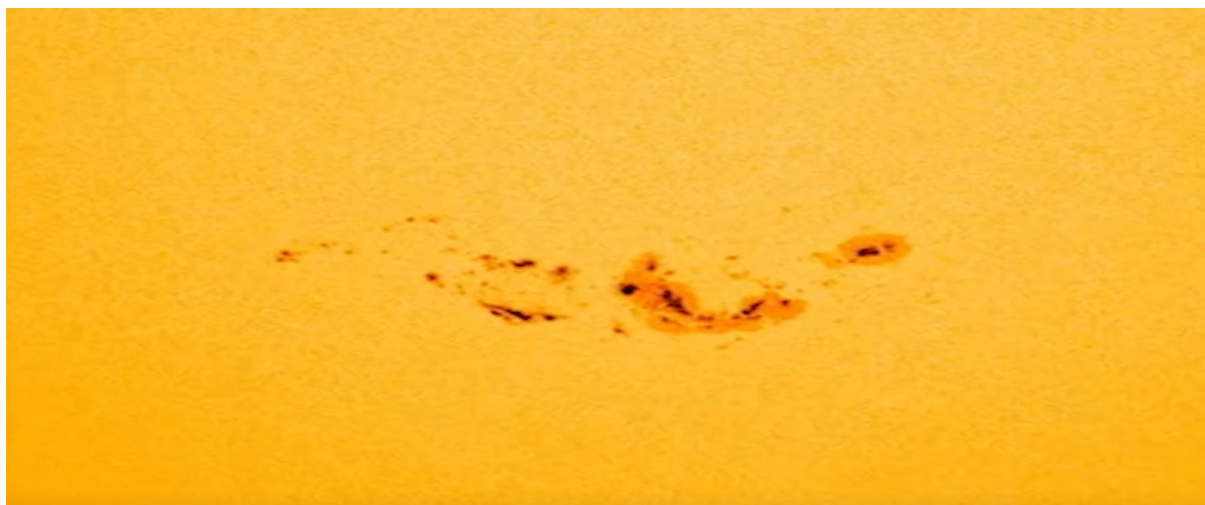


Figure 2: Sunspot AR3664

Even when we work very hard to reach the goals we set ourselves, there are things outside of our control that can get in the way. That's when we dust ourselves off and try again.

As I mentioned above, I was able to get my “one CW QSO” for the day – unfortunately not with QRP power levels. What helped with that was to know where people were eager to operate: I first tried every single POTA park that was activating with CW without luck, and then I took advantage of the SKCC WES operating event. There was only one station I could copy – several times I thought that I heard some faint CW deep down in the noise, but not enough to even make out who was operating – and that was enough to check off that day.

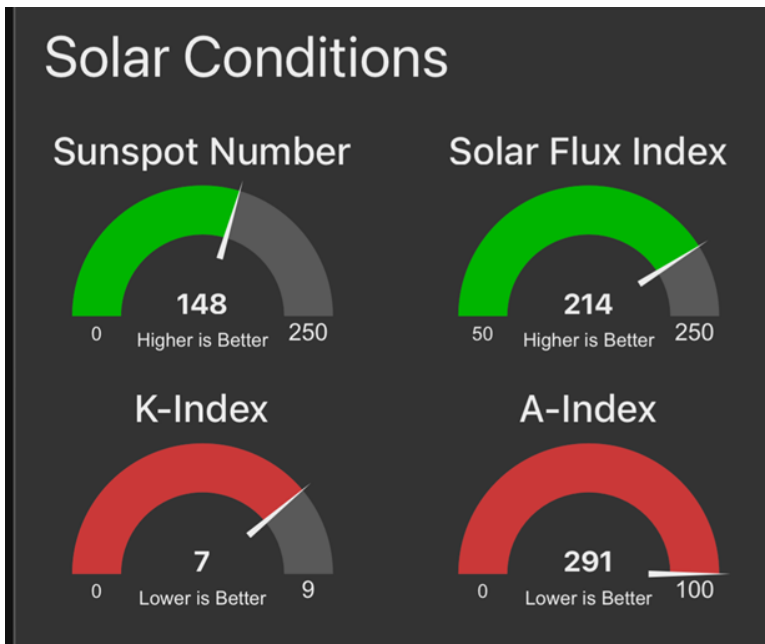


Figure 3: Solar conditions

The space weather conditions have improved, and I am hoping that this will stay that way for a while, and if not, I am hoping that next time I will actually see the aurora.

BTW, the best place to get information about the current space weather conditions is the NOAA space weather dashboards: <https://www.swpc.noaa.gov/dashboards>. Pick the dashboard that you are most interested in. The “Space Weather Enthusiasts” will give you everything!

DOWN THE RABBIT HOLE PART I AN EASY FIX — HARD TO GET TO

SCOTT THEIS, W2LW

About 30 years ago I was on one of my usual hunts for treasure in my hometown of Minneapolis when one of the many Tektronix scopes caught my eye, a 335. They only wanted about \$100 for it, a fair amount of scratch for me at the time (and for my family in the mid-90s) but I forked out the dough and went back to New York a week or so later with my new treasure. At the time I did not have an oscilloscope, so I was quite excited. While it was dual trace, it had only a 35MHz bandwidth. It also beat doing what I used to do which was haul my projects, if possible, to the office for testing. Besides, I had changed jobs and — no more scope. It was also portable, operating on 110AC or 12-24 DC.



It soon became apparent that the trigger was a little funky, but it worked well enough. Not too many years later, I inherited a Tektronix 2235 100MHz dual trace bench unit, so the 335 got used for aviation and other off bench projects. Later when I moved to Rochester, I used it several times to troubleshoot EEG circuitry at the URS BSC Lab. But the trigger was always flaky.

Things changed, the trigger became very dysfunctional, and the 335 collected dust for years until I decided to clean it off and put it to use as an alternate on my antique electronics bench. While applying TLC, I pulled the trigger assembly knobs only to discover the outer shaft for the level pot was sheared off at the base of the pot. Later you'll see the proper shaft. Yeah, not serviceable.



So... What is a Trigger Anyway

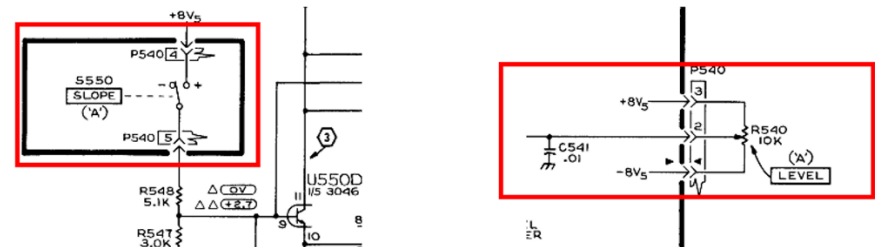
A basic oscilloscope consists of three main components: (a) a calibrated horizontal sweep oscillator to move the electron beam on the CRT from left to right; (b) one or more calibrated amplifiers to move the beam up and down; and (c) a control mechanism to synchronize what is being displayed. Without a trigger control, the display would be a hopeless jumble and the user would be messing with the sweep frequency to see a stable wave form. A wave form that would never "lock in" or synchronize for viewing.

This is where a trigger circuit comes in. The sweep oscillator can free run, be

tickled or synchronized if the frequency is close enough (or a multiple), or the sweep can wait for a trigger then move across the screen at a precise rate.

For older scopes, the processing, user controls and precision were limited. As analog scopes became more and more sophisticated and precise, so did their controls. Just look at the picture to the right: all the controls in the red boxes have to do with the time base, sweep, delay, trigger and source. The bad pot is to the lower left. The remaining controls to the lower right are channel one and two calibrated attenuator selector (big knob), combination position and variable gain and finally, on the far right, the pull switches that set each channel as AC/DC coupling or ground (off or flat).

Fortunately, it was easy to find that combination pot/switch in the circuit:



If you would like to take a closer look:

w140.com/tekwiki/images/4/4b/Tek_335_demo_support_package.pdf

Can I Get One?

I found the manual and located both the value and the part number. A search led me to eBay where I found a similar part (at least seemingly correct because I was not able to visually check it since I still had not removed the part).

The thought had occurred to me to try to rig something up and make it work — but I don't much like butcher jobs.

I pressed “pay” — it was a multi-week wait but it finally came (from Greece the country, not the Rochester suburb).

Attacking Disassembly

Once the part came, I felt safe ripping into the unit to try and replace the bad pot. I had a suspicion that this was not going to be easy, and it wasn't. This repair is not for the faint of heart. I looked online and surprisingly these are still fetching a couple hundred bucks (at the asking), so I figured the adventure would result in: failure and a scope for parts, failure and a paperweight, or success and a repaired scope.



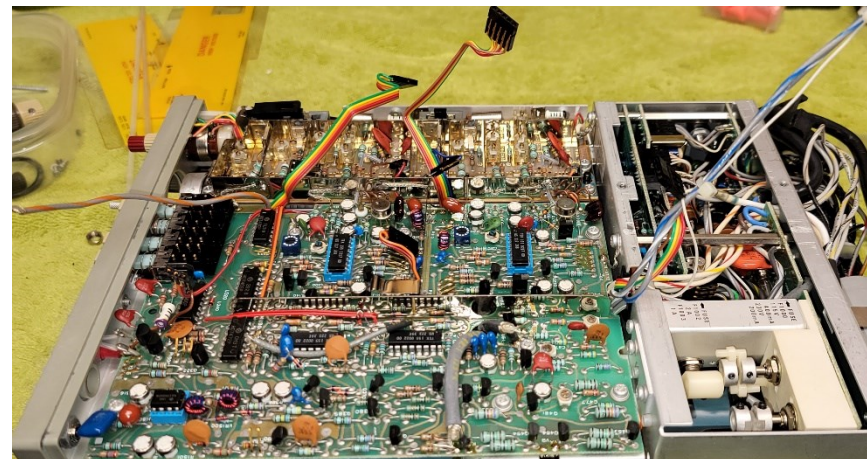
Right away the task presented a challenge. I was hoping that I could pull the front panel out enough to access the pot. But that was not happening. After looking at the manual, it seemed as if the only avenue was to remove the vertical amplifier board (green) as seen to the left. This was screwed down and further held in place by bunch of inline connectors and hard soldered lines — quite a few lines.



Here is a side view. I was quickly taking stuff apart in a failed attempt to release the front panel. I was a little too aggressive on disassembly, as I later found out.

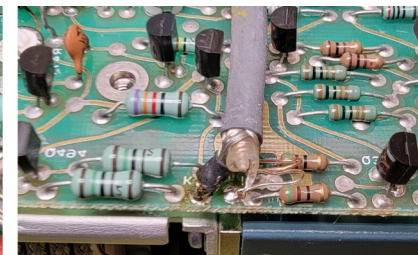
Down the Rabbit Hole

After taking a lot of pictures I started desoldering and pulling connectors. An hour or so later I had the bulk of the easy stuff done. I had to remove the power and focus shafts and unsolder a lot of lines.



That left two major things to unsolder: the link to the attenuator board and the delay line.

At first, I wondered what the odd helical coaxial looking cable was entering and/or exiting the vertical amplifier board:



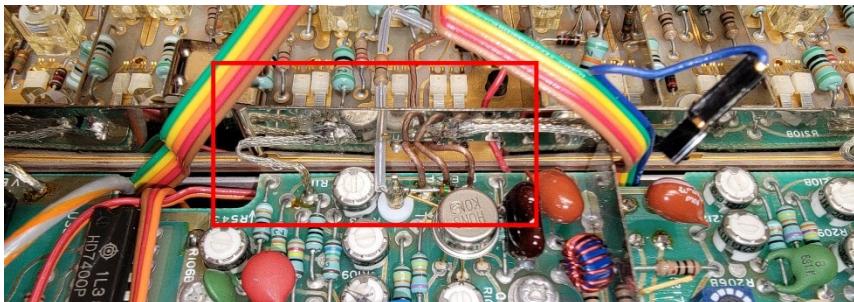
which then wrapped around the CRT neck:



Then I noticed that it was around the neck but not part of the CRT since it is wrapped on a steel cylinder over the neck. (Notice the red high voltage line for the anode at the bottom of the picture. No touchy!) Ah, a delay line. This

was confirmed by the schematic showing two channels running through the delay line prior to final amplification. Presumably, this is to delay the vertical signal such that the triggered edge can be visible within the trace on the CRT.

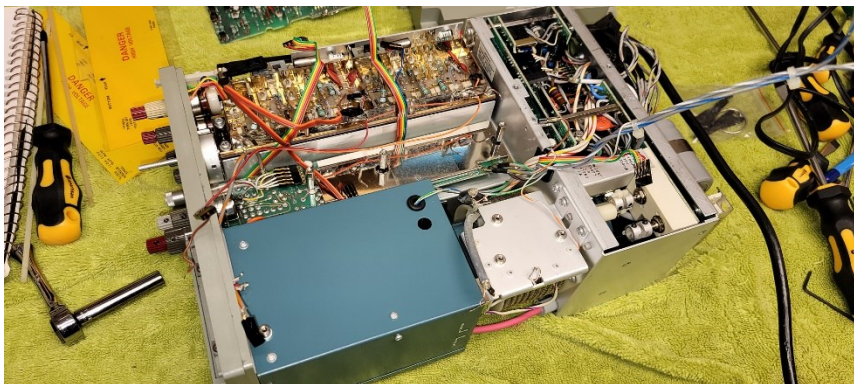
Next was the attenuator board connections and braded grounds:



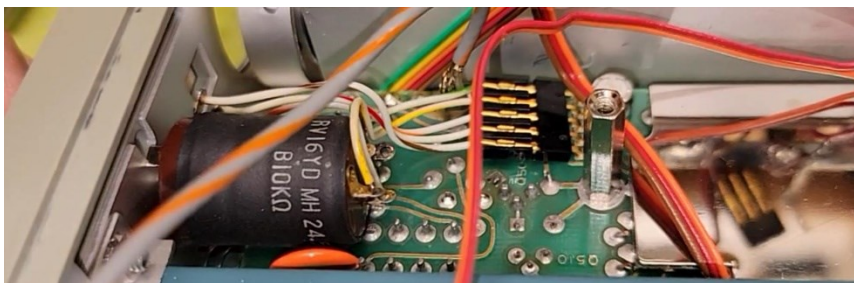
Times two — one for each channel.

Finally, Pay Dirt

After more gentle tugging and disconnecting, finally the board came off:



From there, replacing the pot was easy.



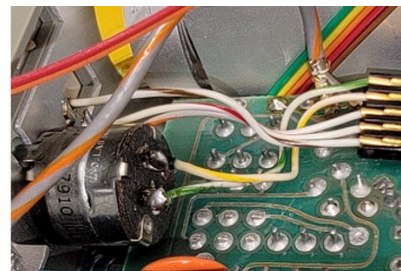
The parts, while slightly mechanically different, had nearly identical shafts (the only part I could visually confirm during the eBay order):



Checking the knob and soldering the cable to the replacement pot.



Installing:



And finally...

Now, can it be reassembled and made to work? Stay tuned for next month... for success or will I get the shaft!



OPERATING EVENT FOR NEW(ISH) HAMS AT BLACK CREEK PARK ON MAY 4TH 2024

KARL HEINZ KREMER, K5KHK

We had a great event on Saturday May 4th at Black Creek Park – this was the fourth instance of this annual event. Once again, we invited what I like to call “New(ish) Hams”. That is of course everybody who got their license recently, or upgraded and received new operating privileges, but also those who’ve had their license for years, but never really gotten into operating, or have taken a break from ham radio for a year or two or twenty, or those who are eager to learn something new, try a new mode, or learn a new skill. And every now and then, we get somebody who is not a ham (yet).



The weather was cooperating – not too hot and not too windy and the rain held off until we were almost done. Not everybody signed the sign-in sheet, so we don’t have an accurate count, but we think we had about 30 people there. Thanks to our Elmers (in alphabetical order by call sign) Bob K2OID, Brian KA2CGB, Paul KD2DO, Rich KD2UBJ, Don KD2WWY, Erik N2EPE, Jon N2JAC, Mike N2MAK, John NV2K, Scott W2LW, Susan W2SBA, Suzanne W2SUZ, Cedric, WA2FTV, and Tim WB2PAY we could offer some interesting activities: Soldering and test equipment, digital modes and Winlink, CW, POTA, antennas, antennas, antennas (for HF and VHF/UHF), QRP, direction finding and a lot more than that when we answered questions from our attendees. We also programmed a few HTs with the repeater listing from the RARA web site. And most importantly, we had a few new hams who made their first on-the-air contact at this event, or their first HF contact. Yay!

I know that even some of those who wore the “Elmer” badge this time learned something new.

We also raffled off some prizes. And even those who did not win did not walk away empty handed: At the end of the day, our attendees had a better under-

standing of ham radio in general, specific modes of operation, and a tip or trick or two.



If you missed this event, please see us at the picnic, we will have radios there and we would certainly answer your questions between a few bites of hot dog or burger.





I hope to see you again at our next operating event.

HOW MUCH IS THAT ~~DOGGIE~~ RADIO IN THE WINDOW ON THE PICNIC TABLE?

Suzanne Bishopp, W2SUZ

On May 4th RARA held a Hands-on Academy session at Black Creek Park. I had a HF portable display with 3 full HF portable stations. I called them Small, Medium and Large. This of course was a bit silly, because the radios that were medium and large were in reality the same size and weight...but where the small, medium and large comes in is the power maximums.

Not only was it great for new hams to see the setups of these radios and use them to make their first HF contacts, I also listed all of the current prices (as of May 2nd) of each component for them to get an idea of how much things actually cost and all the little things you need for each set up to get on the air. As always, these prices depend on where and when you purchase the items, and what you may have laying around the house to build your antenna (old wire can have a new life as an antenna!).

A few of our new hams took pictures of my list, but just in case those pictures didn't come out, or if you couldn't make it to the Academy, I have the equipment/component lists below with those current prices as of May 2nd, 2024 in the below charts.

- If you are a new ham and want a small set up, portable operation is a great way to get on the air.
- If you live in an HOA situation, portable operation is a great way to get on the air.
- If you enjoy the outdoors, portable operation is a great way to get on the air.
- If you want to be prepared for emergency operations, portability is key to fulfilling this mission.

Keep in mind that QRP (10W operation or less for SSB and 5W or less for CW) can be challenging for a new ham, so you might not want to start out that way. An Elmer advised me to start with 100 watts, but I know many hams that have started with, and stuck to 20 watts.

Obviously, I like portable operation. It goes hand in hand with my love of camping, hiking and playing radio. I encourage everyone to get outdoors and set up your station.

Buying equipment can be daunting to a new ham, so I hope this list helps you. I'm in no way saying these are your only options, because there are many, many more, but it is a starting place to know what you need, and about how much you need to put into your HF portable station.



Small

Max 5 Watts

Equipment	Est. Cost
Elecraft KX2 Shack in a box	\$ 1,603.60
KX 2 transceiver	
KXAT2 Internal Antenna Tuner	
Battery charger	
2.6 Ah Battery Pack	
Quick Release ground plug	
MH3 Hand Microphone	
Carrying case	
KX2 book	
Hat	
"Small" Radio Total Before Antenna Gear	\$ 1,603.60
Antenna gear	
AX1 Antenna	\$ 110.00
40 M Coil	\$ 60.00
Whip BiPod	\$ 32.00
	\$ 202.00
Grand Total	\$ 1,805.60

Medium Max 20 Watts

Equipment	Est. Cost
Xiegu G90	\$ 445.00
G90-H1 Holder Cooling Fan	\$ 70.00
"medium" Radio Total	<u>\$ 515.00</u>

Power

Buddipole PowerMini 2 charge controller	\$ 175.00
Bioenno Power 9Ah battery	\$ 100.00
	<u>\$ 275.00</u>
Total before Antenna gear	<u>\$ 790.00</u>

Antenna gear

50 foot RG-8 Coax cable	\$ 60.00
LDG RU-1:1 Unun - not needed with Resenant Ant.	\$ 30.00
Antenna of your choice...	
Random wire w/ counterpoise	\$ 30.00
	<u>\$ 120.00</u>

Grand Total with Home made Antenna	\$ 910.00
---	------------------

Large Max 100 Watts

Equipment	Est. Cost
Yaesu FT-891	\$ 680.00
LDG 100Plus Auto Antenna Tuner	\$ 190.00
Tuner interface cable	\$ 24.00
Coax Jumper cable	\$ 15.00
"large" Radio Total	<u>\$ 909.00</u>

Power

Buddipole PowerMini 2 charge controller	\$ 175.00
Bioenno Power 20Ah battery	\$ 193.00
	<u>\$ 368.00</u>

Total before Antenna gear	<u>\$ 1,277.00</u>
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Antenna gear

50 foot RG-8 Coax cable	\$ 60.00
LDG RU-1:1 Unun - not needed with Resenant Ant.	\$ 30.00
Antenna of your choice...	
End fed Half wave	\$ 30.00
	<u>\$ 120.00</u>

Grand Total with Home made Antenna	\$ 1,397.00
---	--------------------

Of course, there are other items you might want or need when choosing to operate portable.
I have a few lists of things with the current pricing as of May 2nd, 2024 listed below.

SOME Antenna choices:

random wire with counterpoise	\$ 30.00
enfed half wave	\$ 30.00
Wolf river coil - SB 1000 TIA Mega	\$ 170.00
Wolf river coil - sporty forty	\$ 30.00
Ham sticks - 5 pack	\$ 92.00
Ham stick - single	\$ 30.00
AlexLoop	\$ 490.00
9 to 1 QRP K6ARK random wire kit	\$ 20.00
QRP Guys EFHW kit	\$ 30.00

Other Accessories:

Arborist Throw weight	\$ 15.50
Throw Line	\$ 35.00
Forest Delux Throw Line Kit w/ Cube	\$ 63.00
Spiderbeam 12 M (40 ft) mast	\$ 100.00
Flag Pole Wheel Stand	\$ 40.00
QRP Tuner ZM-2 ATU	\$ 105.00
PowerFilm 20 Watt Solar Panel	\$ 422.00
(many solar panels are less expensive)	

SOME Portable Key choices:

CW Morse camel back key	\$ 40.00
Vibroplex Hi Mound HK-705 key	\$ 50.00
Putikeeg Mini CW Key	\$ 36.00
CW Morse SP-4 POTA/SOTA Paddle Key	\$ 93.00
Yhodi Stainless Steel Double Paddle key (Amazon)	\$ 58.00
CW Morse Pocket Paddle	\$ 50.00

FIELD DAY 2024 XRX RADIO CLUB/AMATEUR RADIO EMERGENCY SERVICES

BOB KARZ, K2OID

"A Field Day Like no Other"..... That's what Webster Blogger Missy Rosenberry called our joint XRX/ARES Field Day in 2021*. It's now time for Field Day 2024, and all area amateurs are invited.

Field Day is by far the largest amateur radio event of the year involving more than 30,000 hams throughout the US and Canada along with a handful of DX stations. While nominally a civil defense preparedness exercise, it is also a contest, an educational opportunity, and for some a 24-hour party.

To simulate emergency conditions most field day operations use generators or batteries for power and temporary antennas often set up in fields or parks.

Field Day has something for everyone. Last year we had twenty-nine hams participate in one way or another. Some helped to set up. Some ran the "get on the air" (GOTA) station reserved for new or inactive hams. Some ran the VHF station. Some ran the computer logging network. Some operated the digital station. Some operated CW exclusively. Some operated SSB exclusively. You get the idea.

This year will be our 39th Field Day. Last year we participated in the 3A class with a GOTA (Get On The Air) HF station reserved for inactive or inexperienced hams, three other HF stations and a VHF station. We finished with 395 CW contacts, 420 FT8 (digital) contacts, and 255 SSB contacts. That puts us in the top 13% of our class, our best showing ever.

The Field Day period runs from 2:00 PM EDT Saturday, June 22nd to 2:00 PM EDT Sunday, June 23rd with antenna setup on Friday June 21st and equipment setup on Saturday morning starting at 10:00 AM. Disassembly starts at 2:00 PM Sunday and will be complete by about 4:00 PM. Participants need not be present the entire Field Day period. Indeed, most of us are not there the whole time. No experience is necessary. In fact, you don't even need to be licensed to help out.

Our Field Day location will again be at the lower soccer fields in Kent Park, 1700 Schlegel Road in Webster. Our Field Day is free. You're welcomed to join us whether you're a new ham, a Field Day "veteran", or not licensed at all. Please contact FD Chair Bob Karz, K2OID, rkarz@rochester.rr.com, if you would like to attend.

*You can find more information on our Field Day at:

1. [A "field day" like no other | webster on the web](#) (a few minor errors but is a great description of Field Day from a lay perspective)
2. [Field Day \(arra.org\)](https://www.arra.org/)
3. June 2024 QST pg. 67



CJ Converse, KB2BMS making her first contact



Pete Fournia, W2ISKY making a contact

MAMMOTH MARCH NEEDS HAMS!

Jon Dickason, N2JAC

Mammoth March is an extreme hiking event held all around the US. On August 10th we will provide safety comms for a 20 mile, 8 hour hike around the amazing Letchworth park. Because of the topography, we may need to be creative with multiple repeaters, cross band and maybe even 6 meters or HF. It may also be physically demanding if we have to shadow event officials and sweep teams on the trails, but there are also opportunities to sit at a nice rest stop and enjoy the event. Hams will be stationed along the course to report injuries and provide situational awareness. You may stay for a half shift if you can't make it all day. This is a perfect way to practice our skills in a challenging environment like we might encounter in a possible disaster situation. Please sign up at <https://forms.gle/XWw3ooidTJKnhKxg6>



<https://www.mammothmarch.com/upstate-new-york-2024>

JUNE 2024 PUBLIC SERVICE REPORT

MIKE MOORE, KC2NM, PUBLIC SERVICE COORDINATOR

Summertime is the public service event season, starting with Tour de Cure in June and concluding with Pumpkin Patrol in October. As you will see in the list of planned public service events in the following table, we have a growing number of events this year, and those events are seeing an increase in participants. As our program is growing, we need to recruit additional event captains, or better, two co-captains, to spearhead these events. Event captains work as part of the organizing team with our served agencies to plan event communications, recruit volunteers to participate in the event and oversee operations on the event day. It is a fun way to increase the outreach of our hobby into the community. RARA has a rich, well-documented, and organized history of event plans. Event captains will, by no means, be starting from scratch. Please consider volunteering as an event captain. You may contact me for more information via email at mikemoore@ieeee.org.

When you sign up to participate in an event, consider a packing list of items you will need to participate in our events.

- Radio(s) that you know how to use, programmed in advance
- Antenna
- Cell phone and charger
- Power source(s) more than sufficient to last all-day
- Food and liquids for the day
- Full tank of gas
- Layered clothing adequate for anything Western New York might throw at you
- Sun protection
- Pencil and paper
- Clock or wristwatch
- Printout of course map and communications plan for your event
- Optional table and shade canopy

Don't let the lack of equipment deter you from volunteering. We believe that everyone has something valuable to contribute. Some events and places only require a handheld radio with a small antenna. You can also assist by operating a station set up by another amateur. New volunteers are always welcomed and trained by experienced ones, regardless of the equipment they have. Inform the volunteer coordinator about your equipment and abilities, and they will find a suitable opportunity for you.

A point to remember about handheld transceivers (HTs): They are incredibly handy and should generally be included in your equipment list. However, they do have limitations. With their standard antennas, they can reliably transmit into repeaters only from a few optimal locations. In many locations, a higher-

powered mobile radio will be necessary, and whenever possible, such a radio is almost always the preferred choice.

So, are you ready to make a difference in our community? I urge you to visit our [public service page](#), sign up for one of our events, and join us for the fun. Your participation is what makes these events successful, and we can't wait to have you on board. Please note the changes to the date and location of the Wilmot Breakaway Ride.

2024 RARA Public Service Events

Event	Location	Day	Date
Finger Lakes Tour de Cure	Finger Lakes Community College Canandaigua, NY	Saturday	June 8, 2024
ADK Outdoor Expo	Mendon Ponds Park	Saturday	June 8, 2024
MS Roc the Ride Great Lakes Adventure	Lakeside State Park	Saturday	August 10, 2024
Mammoth March Upstate NY	Letchwork Park	Saturday	August 10, 2024
ILLW	Charlotte-Genesee Lighthouse	Saturday and Sunday	August 17-18, 2024
Fairport Lift Bridge Regatta	Erie Canal – Fairport, NY	Saturday	Sept 21, 2024
Wilmot Breakaway Ride	UR Central Lab, 211 Bailey Road, West Henrietta	Saturday	Sept 21, 2024
JOTA / Ham Radio Demonstration - CTC	Camp Cutler, Naples, NY	Saturday	Oct. 19, 2024
Pumpkin Patrol	Overpasses of the New York State Thruway	Wednesday and Thursday	Oct. 30-31, 2024

MAY MEETING REVIEW: GETTING STARTED WITH HF

TIM BARRETT, K9VB, RARA VICE PRESIDENT

There were 45 in-person and 22 online attendees at our May meeting. As a new idea we had a display of various types of multi-meters, voltmeters and ammeters. Our display covered from around 1900 up to the present and was well received. We hope to do similar displays of radio-related gear at future meetings and we have discussed how we can make this visible to our online attendees as well. Suggestions of suitable displays are welcome!

There were two presentations, the first was by Mike Moore who covered the VHF digital communication systems such as DMR and System Fusion. The second presentation was by myself and covered how to get started on HF. Both presentations generated questions and comments. The HF presentation is a precursor to a more in-depth academy session we hope to do in the Fall allowing our less experienced members to get a detailed understanding of HF techniques.



RARA CALENDAR

TIM BARRETT, K9VB, MEMBERSHIP SECRETARY

June 2024						
Sun	Mon	Tue	Wed	Thu	Fri	Sat
						1 ROC City Net 28.405 MHz, 9pm 10-10 PSK Contest PVRC Reunion UKSMG Summer Party Wake-Up! QRP Sprint Kentucky QSO Party Tisza Cup CW Contest IARU Region 1 Field Day, CW ARRL Inter. Digital Contest
2 UKSMG Summer Party Kentucky QSO Party Tisza Cup CW Contest RSGB Field Day IARU Region 1 Field Day, CW K1USN Speed Test ARRL Inter. Digital Contest	3 AWA Net 145.110 MHz, 7pm VHF Group 9pm 144.260 SSB ICWC Medium Speed Test OK1WC Memorial WW Sideband Activity Contest ARS Spartan Sprint	4 JS8 Learning Group 14.078 MHz, 9pm Phone Weekly Test	5 ROC City Net ~3.830 MHz, 7p A1 Club AWT CWOps Test VHF/UHF FT8 Activity Contest Mini Test 40, 80 Walk for the Bacon Contest	6 RARA BoD Mtg 6:30pm ARES Net 146.610 MHz, 7pm VHF Group 9pm 50.205 USB NRAU 10m Activity Contest NCCC FT4 Sprint SKCC Sprint (Europe) Weekly RTTY Test	7 K1USN Speed Test HA3NS Sprint Memorial Contest	8 ROC City Net 28.405 MHz, 9pm Tour de Cure ADK at Mendon Ponds VK Shires Contest Asia-Pacific Sprint, SSB Portugal Day Contest REF DDFM 6m Contest AGCW VHF/UHF Contest ARRL VHF Contest
9 Asia-Pacific Sprint, SSB Portugal Day Contest SKCC Weekend Sprintathon GACW WWSA CW DX Contest Batavia DX Contest REF DDFM 6m Contest AGCW VHF/UHF Contest ARRL VHF Contest	10 AWA Net 145.110 MHz, 7pm VHF Group 9pm 144.260 SSB ICWC Medium Speed Test RSGB Club 80M Contest, Data OK1WC Memorial WW Sideband Activity Contest	11 JS8 Learning Group 14.078 MHz, 9pm Phone Weekly Test	12 ROC City Net ~3.830 MHz, 7p A1 Club AWT CWOps Test VHF/UHF FT8 Activity Contest Mini Test 40, 80	13 ARES Net 146.610 MHz, 7pm VHF Group 9pm 50.205 USB Weekly RTTY Test NCCC FT4 Sprint	14 K1USN Speed Test	15 ROC City Net 28.405 MHz, 9pm All Asia DX Contest, CW IARU Region 1 50MHz Contest Stew Perry Top Band Challenge WV QSO Party SMIRK Contest Pajajaran Bogor DX Contest LZ International 6 Mtr Contest ARRL Kids Day
16 All Asia DX Contest, CW IARU Region 1 50MHz Contest Stew Perry Top Band Challenge WV QSO Party Feld Hell Sprint SMIRK Contest Pajajaran Bogor DX Contest ARRL Kids Day	17 AWA Net 145.110 MHz, 7pm VHF Group 9pm 144.260 SSB ICWC Medium Speed Test OK1WC Memorial RSGB FT4 Contest WW Sideband Activity Contest	18 JS8 Learning Group 14.078 MHz, 9pm Phone Weekly Test NAQCC CW Sprint	19 ROC City Net ~3.830 MHz, 7p A1 Club AWT CWOps Test VHF/UHF FT8 Activity Contest Mini Test 40, 80 Walk for the Bacon Contest NAQCC CW Sprint RSGB 80m Club Champ, CW	20 ARES Net 146.610 MHz, 7pm VHF Group 9pm 50.205 USB NTC QSO Party NCCC Sprint NCCC FT4 Sprint Weekly RTTY Test	21 K1USN Speed Test	22 ROC City Net 28.405 MHz, 9pm ARRL Field Day King of Spain Contest, SSB Ukrainian DX DIGI Contes
23 ARRL Field Day King of Spain Contest, SSB Ukrainian DX DIGI Contes	24 AWA Net 145.110 MHz, 7pm VHF Group 9pm 144.260 SSB ICWC Medium Speed Test OK1WC Memorial WW Sideband Activity Contest QCX Challenge	25 JS8 Learning Group 14.078 MHz, 9pm Phone Weekly Test	26 ROC City Net ~3.830 MHz, 7p A1 Club AWT CWOps Test Mini Test 40, 80 RSGB 80M Club Contest , SSB	27 ARES Net 146.610 MHz, 7pm VHF Group 9pm 50.205 USB NCC FT4 Test Weekly RTTY Test CW Ops Test	28 K1USN Speed Test	29 ROC City Net 28.405 MHz, 9pm UFT QRP Contest

VE TEAM

Testing takes place on the 3rd Saturday September - April

Testing will resume on September 21

Testing Location

RIT
Rochester Institute of Technology
Building 16 -Schmitt Interfaith Center
43.08402626755475, -77.6734520379509

- Easiest path is from Parking Lot D it can be accessed from West Jefferson Rd via Andrews Memorial Dr or Lowenthal Rd
- From parking lot D walk south up the ramp to the Schmitt Interfaith Center.
- Once inside there is an elevator over to your left or stairs in front of you. Go to the first floor and you will find the Skalny room.

Please Note: this room cannot be accessed from the door under the bridge.

Pre-registration is required visit:

<https://hamstudy.org/sessions/14612/inperson> to find the latest session.

More information is available on the RARA website:

https://rochesterham.org/license_testing.htm

Applicants must supply their own pen, pencil, calculator

Testing begins at 10:00AM.

Also Note: The exam is free however the FCC now charges \$35 for applications. This fee is NOT paid to the VE team. It is paid directly to the FCC. You will receive an email from the FCC when your application is processed. We will also have an information sheet available

NEWS FROM AREA CLUBS

MONROE COUNTY ARES / RACES NEWS

Monroe County Amateur Radio Emergency Service (ARES)® is an amateur radio public service organization based in Monroe County, New York, and is open to all licensed amateur radio operators. Monroe County Radio Amateur Civil Emergency Service (RACES) is a program of the Monroe County Office of Emergency Management. We participate in training and emergency exercises so that we can serve other agencies during times of communication failure.



The Monroe County Amateur Radio Emergency Service, Inc. holds its meetings on the fourth Thursday of each month except in July, August, November and December. The meeting in November is on the third Thursday to avoid interfering with Thanksgiving. Anyone interested, members and non-members, are welcome to attend. The meetings are in person at 6:00 PM at the county EOC in even months and at the Red Cross in odd months. They are also available via Zoom. Please check our website for any schedule changes. Prospective members can request an invitation by email to: secretary@monroecountyemcomm.org.

Monroe County ARES/RACES meets on the air every Thursday of the month at 7:00 PM, on the W2ARM 146.61 MHz (-) 110.9 Hz PL and 444.45 MHz (+) 110.9 Hz PL repeaters. Our club callsign is WB2EOC. On nights when we hold our regular meeting, the net is at 5:30 PM.

Web: www.monroecountyemcomm.org

Facebook: Monroe County Amateur Radio Emergency Service, Inc.

Twitter @MCARESNY

ROCHESTER DX ASSOCIATION, RDXA



NEXT MEETING: TUESDAY 18 JUNE, 7:00PM

LOCATION: JOHNNY'S, 1382 CULVER RD

PROGRAM—N2RD (RAJ) MULTIBAND RECEIVE ANTENNA ARRAY OF VERTICALS WITH NO RADIALS

Go to RDXA.COM for additional information

XRX AMATEUR RADIO CLUB

The XRX Amateur Radio Club meets the second Thursday of the month (except July and August). 7PM at the Webster Recreation Center. Zoom meeting info, when available, is sent out to our mailing list. How to subscribe and up-to-date information is always on our website at <http://xarc.us> We have a System Fusion repeater south of the city on 145.290, and another on 444.825 west of the city that is also D-Star capable. Both are also analog capable with 110.9Hz tone. All are welcome.

AMATEUR RADIO ASSOCIATION OF THE SOUTHERN TIER, ARAST

ARAST meets the third Thursday of every month at the Emergency Communications Center on Harris Hill in Big Flats, next to the National Soaring Museum. Our Chemung County ARES (CCARES) organization meets the first Tuesday of the month except February at the same location. Both organizations serve amateurs in Chemung, Steuben and Schuyler counties in New York and Bradford and Tioga counties in Pennsylvania. All are welcome to attend our meetings.

NOTE: Both CCARES and ARAST monthly meetings are now being held both in person and online. Check out the Upcoming Events at our website, www.arast.info, for the latest details.

Don't forget to check out our repeaters when you visit the area. N3AQ 147.36(+) and the W2ZJ 146.70(-) are the principal 2-meter repeaters. The latter can also be accessed via Echolink node 574415 with the call sign KD2QND-R. A full list of repeaters that can be heard in the Twin Tiers area surrounding Chemung County can be found at http://www.arast.info/arast_website/public/repeaters.php.

We also invite you to check out our new 6-meter net on Wednesday evenings at 9 p.m. local time on 50.200 MHz USB. The net usually lasts approximately one hour. Operators are encouraged to check in and participate in the round table discussions or simply stop by from time to time. We would welcome participation from RARA members.

COMMUNITY AMATEUR RADIO CLUB, CARC

If you are interested in being a part of this forward thinking and active club, visit us at a meeting or join us on one of our weekly nets. We meet at the Hoag Library (134 S. Main St. Albion, NY) on the first Saturday of each month at 7PM. Each meeting has a brief training/refresher period with upcoming topics including: net protocol, repeater set-up/maintenance, and digital signaling. The club holds a net every Sunday evening at 8pm (winter) and 9PM (summer) - 0100 UTC Monday - on 147.585 simplex, and we host the Thursday Night Social Net, Thursday at 8:30PM on 147.285+. We'd love to hear you check-in!

DRUMLINS AMATEUR RADIO CLUB

The Drumlins Amateur Radio Club meets every third Wednesday of the month at 7:30 PM at the Wayne County EMO/Sheriff's Office 7376 State Hwy 31 #1000, Lyons, NY 14489. Doors open at 7 pm, meeting starts at 7:30 pm. Announcements will be made on the 146.685 repeater. The Drumlins ARC website address is <http://drumlinsarc.us/>

DIGITAL COMMUNICATIONS ASSOCIATION OF PERINTON, DCAP

DCAP members continue to experiment with leading edge digital communication modes. We were formed in 1994 to foster the development of local and regional packet radio networks using AX25 and TCP/IP. Today we have members using the club sponsored DSTAR repeater (KB2VZS on 444.8MHz), several personal and publicly accessible DSTAR hotspots, Yaesu System Fusion systems on non-club repeaters and DMR systems through repeaters and personal hotspots. DCAP members meet for breakfast at 7AM nearly every Saturday morning at Riki's Family Restaurant in the village of Fairport and everyone is welcome to join us. Talk in is on the KB2VZS analog repeater on 146.715MHz with a PL tone of 110.9Hz.

KEUKA LAKE AMATEUR RADIO ASSOCIATION, KLARA

The Keuka Lake Amateur Radio Association Hamfest is August 17th at the Howard Community Center. Breakfast, coffee, tailgating and Ham Radio! Friendliest little Hamfest around. More details next month.

Our meetings are always the 2nd wednesday. Dish to pass meal at 6pm with meeting at 7pm. All are welcome.

Don't forget our daily Monday thru Friday 75 meter HF net. Check in at 7:45am starts 8:00 am on 3.896. Always a great way to start your day.

73,
Belinda KD2BPJ

ORLEANS COUNTY AMATEUR RADIO CLUB

The Orleans County ARC meets every 2nd Monday of the month at the Orleans County Emergency Operations Center, 14064 West County House Road, Albion, NY 14411. Doors open at 6:00PM, meeting starts at 7:30PM. Anyone with an interest in amateur radio is welcome. Program topics vary from month to month.

The club has an open two-meter net every Tuesday night at 9:00PM local time on the club repeater, WA2DQL/R (145.27 -600KHz offset, 141.3 tone). Everyone is welcome to check in.

See the club website <http://ocarc.us> or contact club Secretary Ron Craig, N5BNO for more information.

ROCHESTER VHF GROUP

You are invited to
join us on-line &
on-the-air! We're
here to help you to
use the license that
you worked so hard to get.



Check out what we do by visiting our
website at <http://RVHFG.org> to start.

Join our e-mail group by sending a message
to RVHFG+subscribe@groups.io.

Join our weekly on-the-air nets on SSB:
2 meter band - Monday 9 PM 144.260 USB
6 meter band - Thursday 9 PM 50.205 USB

No VHF SSB radio (yet) to join the nets?
Log-in to Echolink ka2ene-L #23426

We can help to answer the question, "What radio should I buy?" Here's a list of HF+++ radios, those with the HF bands and at least three VHF bands, giving you access to all sorts of VHF fun. Research each one to see which serves you best. Ask questions on our email list. We're here to help!

Yaesu FT-100D	Yaesu FT-817	Yaesu FT-818
Yaesu FT-847	Yaesu FT-857	Yaesu FT-897
Icom IC-706MKIIG	Icom IC-7000	Icom IC-7100
Icom IC-9100	Kenwood TS-2000	

Some are older models and some are newer models, but all provide access to the 6 meter, 2 meter, and 70 centimeter bands using both traditional FM and the exciting narrow-band SSB mode that supports unexpectedly long-distance (100's of km's routinely and 1,000's of km occasionally) VHF communication. These are good all-around radios no matter what club you end up affiliating with later. We hope its us.

SKENOH ISLAND AMATEUR RADIO CLUB, SIARC

The Skenoh Island Amateur Radio Club and meets every second Wednesday of the month at 7:30PM at the Ontario County Safety Training Facility, 2914 County Road 48, Town of Hopewell. We have License Exam Testing every other month which begins at 6:30PM. The next meeting will be on Wednesday, June 12. There will not be VE testing in June.

SIARC is also holding a Health and Welfare NET Monday through Friday each week at 2000 hours on the SIARC 146.820 repeater (located in Canandaigua, NY), Tone 110.9. This net is to pass along general information and keep hams in touch. All hams are invited to participate.

73's
Steve Benton
WB2VMR

ROCHESTER RADIO REPEATER ASSOCIATION

The Rochester Radio Repeater Association will be having its regular meeting on June 17 at the Pittsford Town Hall meeting room in the basement at 7:30pm. There is parking and an entrance at the back of the building. Visit our web-site, www.k2rra.org for any current / last minute information and a map. June's meeting will be RRRA's annual election of Officers. We won't be able to hold an election if we can't make a quarm. Please attend if you are a member.

The current club officers are Bob Odell, N2BZX - President, Bob Shewell, N2HJD - Vice President, Jay Stewart, W4JPS - Secretary, and Jerry Powell, KC2YSY - Treasurer / Membership Chairman. RRRA also accepts donations to the club. If you are not currently a member and want to support RRRA, you can join at our monthly meeting or on our web site using PayPal. www.k2rra.org

THE AMATEUR'S CODE

Originally written by Paul M. Segal, W9EEA (1928)

THE RADIO AMATEUR IS:

CONSIDERATE	Never knowingly operating in such a way as to lessen the pleasure of others.
LOYAL	Offering loyalty, encouragement and support to other amateurs, local club, and the American Radio Relay League, through which Amateur Radio in the United States is represented nationally and internationally.
PROGRESSIVE	With knowledge abreast of science, a well built and efficient station and operation beyond reproach.
FRIENDLY	With slow and patient operation when requested, friendly advice and counsel to the beginner, kindly assistance, co-operation and consideration for the interests of others. These are the hallmarks of the amateur spirit.
BALANCED	Radio is an avocation, never interfering with duties owed to family, job, school or community.
PATRIOTIC	With station and skill always ready for service to country and community.



AWA Educational Institute

2024 Hands-On Classes

Learn It, Build It, Fix It

Vacuum Tube Guitar Amplifier	7 Saturdays Starting 6/29
Vacuum Tube Radio101 Boot Camp	Sunday-Tuesday 9/29-10/1
Solid State Audio Theory	3 Saturdays Starting 10/12
Test Equipment Familiarization	Saturday 11/9

To get more information visit: www.antiquewireless.org/homepage/learn-build-fix-classes/

AWA SHARES

MICHAEL C. MIGLIACCIO, N3HLM, VICE PRESIDENT, AWA

The monthly *AWA Shares* is about to stage its thirtieth presenter. Thanks to the video on-line streaming of Zoom becoming so popular in the past few years, people are now able to learn more about the historical and technical universe of communications. Presented topics have ranged from accounts of the bygone era of electrically assisted communications to the specific technology details of practical designs. Every third Wednesday of the month Zoom presentations bring you the adventures of early communications pioneers into the privacy and convenience of your home. Audio kits, locating power line noise, NASA communications, early amateur radio pursuits, telegraphy, broadcast history and many other topics delivered to you, in the comfort of your special space where you can sit in your comfy clothes, sip a favorite beverage, enjoying your favorite snack. I encourage you to go to the AWA website and register for the free monthly *AWA Shares* presentations.

Link: <https://www.antiquewireless.org/homepage/awa-shares/>

20 Years Ago, June 2004

This was another giant issue filled with news of the just completed three-day RARA Hamfest and ARRL convention. It took two writers to cover the results of the 70th Hamfest and ARRL Convention that will be detailed next. Our first author was outgoing President Brad Armstrong W1YX, who finished his 2003 – 2004 term with final duties at the Hamfest Banquet. Brad was very pleased to announce a special recognition given to Edwin Holdsworth (sk) N2EH, upon his thirty-three years of service to RARA and to the administration of the Rochester Hamfests and its outstanding success and service to the Amateurs in the North-eastern United States. Details of that recognition ceremony were further written by Harold Smith (sk) K2HC and published in this issue. Brad continued by telling of another special award presented to Richard Goslee (sk) KG2I, recognizing his seventeen years as Club Treasurer as well as many other services to RARA. Brad then finished his duties by announcing further summertime RARA activities and encouraged members to join in.

This Hamfest news issue was also filled with photos covering full pages of what could have been some memory jogging fun filled reading moments. Instead, there were poorly taken photos with bad composition, lighting and focus. Any amateur with a cellphone camera could and should do a better job in collecting important history.

It was a pleasure to see a report in a photo of as many RARA Past Presidents as could be assembled at the last RARA Meeting. Seen were 14 past presidents, but sadly in this 2004 photo only four remain with us today: Those being Lloyd Cook N2PU, Peter Fournia W2SKY, Ed Gable K2MP and Cliff Milner W2SKO. Pictured was Dick Fish (now sk) W2OWF, President in 1948 and the oldest ham, born 1917.

This issue found a guest author, that being Ross Mazzola KC2LOC. Ross wrote a very thoughtful half-page story that chronicled his entry into Amateur Radio and shared information of the many local hams that gave of their time and experiences to help Ross beat obstacles along the way.

Cited in this issue with a story written by Dick Goslee KG2I, was the life of a longtime friend of RARA, Mrs. Lia Zwack WA2NFY. Lia is remembered by many of us as the go to person when there was a member in need for any reason. She wrote many individuals personal letters, helpful advice and was always there to lend a friendly ear. Lia was also an active ham and could be found participating in YL nets and when rag chewing it would be on CW. Lia liked to collect DX QSL cards and when entering DX pile ups it would be mildly and politely, terms not immediately associated with DX Pile ups now days. Her station was proudly set up and maintained by her husband Lee, W2WPF. Some of us were lucky enough to remember seeing Lee and Lia tooling around, top down, in Lee's collectable condition C3 Corvette.

Another proud Hamfest moment was the awarding of this year's winner of the RARA Memorial Scholarship to John R. McIntyre, KC2JSJ. John, the son of active RARA Member Marv McIntyre (sk) K2ZAA, told in his acceptance speech how much the scholarships helped in fulfilling his goal of becoming an Electrical Engineer and encouraged his starting RIT's BSEE program.

Things change fast in the world of Web-Design and in the number of URL's one needs to remember. True for RARA as well. From now on use the new RARA Domain name to find the newest updated website. Go to (all one word): www.rochesterham.org.

With regret it was reported that Ralph Baxendale W2RSS, David Stewart K2ZCD, Robert Osborn ex-W2CFE and Bill Donnell W2XJ, were reported as Silent Keys. There were no Want Ads in this issue. I suppose it was possible all items went to the Hamfest flea market instead of these pages? "Huge Savings" was the headline in the commercial advertisement of Mary Kay Vesco. KC2DPG, an Independent Health Services agent.



the *RARA RAG*

Published by
ROCHESTER AMATEUR RADIO ASSOCIATION, INC.

VOL. 56

JUNE 2004

NO.10

"Prez Says"

Brad Armstrong W1YX President

The gavel has been passed. The Banquet last Friday evening was a fine affair. Both the Atlantic and Hudson Division Directors attended, and the Atlantic Division Sections were well represented. I had the chance to make a few remarks about the importance of getting information and responsibility out to as much of our ranks as possible, but Dick Goslee ably hosted most of the evening. Awards were presented in recognition of three of our Club members' service to the amateur community. Lia Zwack, WA2NFY, was honored for her ongoing kindnesses to the families of SK's. Ed Holdsworth, N2EH, was honored for his endless years of service to the Club in more ways than most of us can even remember. Finally, I had the honor of presenting an award to Dick Goslee, KG2I, recognizing his 17 years as Club Treasurer among his many other services to the Club.



I would like to also take a moment to recognize here the work of the Hamfest Committee. Harold Smith and his "coolies" worked long and hard in the past week and put on another great event for us all. We had more than our fair share of presentations from the

League, in addition to all the usual events and vendors that make our Hamfest one of the best in the World. I personally had the opportunity to meet folks from all over the country who were in town for our weekend event. Local hams came out in force as well to enjoy the fine weather and do a little bargain hunting. It is too bad that every weekend of the year can't be the Rochester Hamfest!

Okay, now that it is summer in Rochester, don't put away your amateur radio gear – there is plenty to do throughout the season.

For starters, don't miss our annual picnic on the 19th of this month. There is no charge for attendance and you can bring your whole family. There will be a series of foxhunts, and all you need is an HT to get in on the fun. I'll be giving a quick lesson on how to find the fox before we start, so even a beginner can have a chance at one of the prizes. You can bring a dish to pass or enjoy the hots and hamburgs, which our President Emeritus George Platter will be serving up, but just don't forget to set aside the 19th to spend with us. We'll be at the Creekside lodge in Ellison Park; for talk-in call K2JD on 146.55 simplex.

There are many opportunities also for public service coming up. Contact our Public Service Chairman, Keith Freeberg, and he'll be glad to tell you all about how you can get involved in serving the community using just your amateur license and equipment you probably already own. Details are available at our Club website, <http://www.rochesterham.org>, or by giving him a call at home at 585-254-0722. No experience is necessary, only a willingness to get involved. Please consider taking time out of your busy schedule to give a little back on behalf of our avocation. You will have a great time and I am certain you'll get a great deal of satisfaction of participating. I look forward to seeing you out there this year!

PICNIC ELLISON PARK 06/19/04

RaRa RAG 1

RAGS OF THE PAST

ED GABLE, K2MP, RARA HISTORIAN

40 Years Ago, June 1984

Surprise, surprise, this issue is also filled with Hamfest news and written by, no surprise, Hamfest General Chairman Harold Smith (sk) K2HC. Harold wasted no words when proudly relating that the attendance tickled the 10,000 mark. Also writing with happy results was the all-important Flea Market Chairman, David Payne, KA2J, who reported that more hams set up in the Flea Market than ever before. And still more. Volunteer Examiner Committee Chairman John Schooley (sk) K2NC, reported 117 applicants took Amateur Exams at the Hamfest location. Finally, at the Friday night Banquet, ARRL President Emeritus, Harry Dannals W2HD, presented the *Radio Amateur of the Year* award to RARA's own Ron Jakubowski K2RJ.

At the last Club meeting of this 1983 – 1984 year, hosted by out-going President Bill Theil K2KGE, members voted for the following slate of new Officers and Board members: President Ray Roberts (sk) WA2SSU, V-P Ron Jakubowski K2RJ, Secretary John Lloyd KA2KfV and Treasurer John VanGriethuysen N2BNE. Elected to the Board of Directors were: Dave N2DPF, Howie N2CUN, Keith (sk) N2BEL, Dick (sk) K2VCZ, Ed (sk) N2EH, Alan (sk) AC2K and Ed N2BXA.

In a most traditional manner, the announcement of RARA's annual picnic was produced thusly. "This year the picnic will be held at Wadhams Lodge in Powder Mill Park. June 2nd. Open to all RARA members, family and guests at no charge."

Ed Holdsworth (sk) N2EH, published the first of several announcements detailing popular public service events scheduled for the year. At this time there were seven weekend events scheduled. Ed continued in this issue with a nearly full-page article describing the operations of a Sports Car Club of America (SCCA) sanctioned Road Rally in Central Pennsylvania near Wellsboro. The challenge in this very hilly area of Tioga County makes radio communications very difficult on any frequency or mode, HF through VHF. After much study and experimentation, the committee decided on using two-meter FM as the main mode. This plan was greatly aided with the application of an unused Fire Observation tower, up at great elevation, upon which was mounted a portable repeater built by the Rochester Radio Repeater Association and working on 146.28/88 Mhz. It was reported that the SCCA officials were both amazed and appreciative of the excellent communications provided by Amateur Radio for both the administration of the event and the very important safety communications provided. The Rally remains a current event and video coverage can be found for the 2023 event at: <https://www.youtube.com/watch?v=8vZlm51zu6A>. Enjoy.

It was common to publish information on area hamfests, some of which may no longer with us, as such: Rome, NY hamfest, Manassa, VA hamfest, SARC ham

fest in Cortland, NY, Batavia, NY hamfest, Mount Beacon hamfest in Poughkeepsie, NY.

With regret it was reported that Hugh MacPherson KA2CSD and Fred Barto ex-WA2GCZ, were reported as Silent Keys. From the Want Ads you could purchase fourteen items from the Hugh MacPherson estate. You could buy Heathkits and/or obtain helpful kit building information from the Heathkit Electronic Center on Jefferson Road.



the **RaRa RAG**

Published by

ROCHESTER AMATEUR RADIO ASSOCIATION, INC.

Rochester, N.Y.

JUNE 1984

Volume 36 No. 10

HAMFEST BEST YET ! ATTENDANCE NEARS 10,000 117 TAKE EXAMS K2RJ NAMED HAM-OF-YEAR

A record crowd of nearly 10,000 people jammed the Monroe County Fairgrounds for the Rochester Hamfest and the Atlantic Division ARRL Convention, Saturday May 19th. According to flea market chairman Dave Payne, KA2J, there were more hams set up in the flea market than ever before.

Thanks to the efforts of Metroplex, the Area 2 Volunteer Examination Coordinator, and the Hamfest Exam Committee, 117 people took Amateur Radio exams, with a pass-rate of nearly 50 percent. Nearly everyone who passed left with an interim operating permit signed by RaRa's first certified volunteer examiners Committee Chairman John Schooley, K2NC; Joe Hood, K2YA; and Ron Jakubowski, K2RJ. All the newly upgraded amateurs you hear signing *interim WB* passed their exams at the Rochester Hamfest.

At the banquet Friday night, Ronald Jakubowski, K2RJ, was presented the *Amateur of the Year Award* by Harry Dannals, W2HD, President Emeritus of the ARRL.

THANKS!

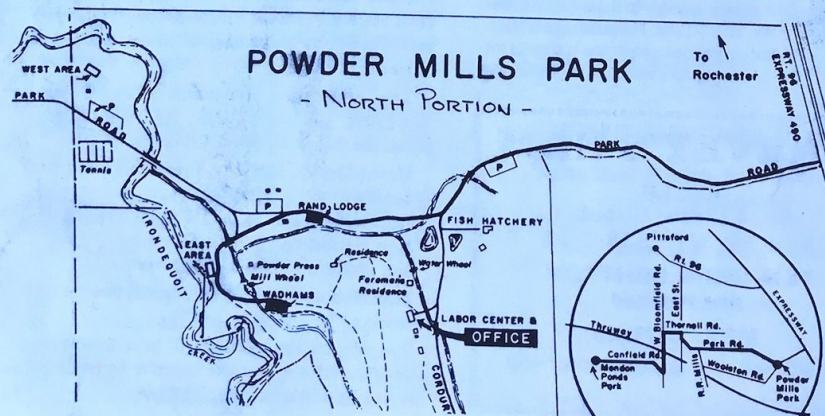
A special thanks to all of you who contributed so much time to make this year's Hamfest the success that it was. I am sure I have not expressed my thanks in person, to all that helped so I extend my appreciation to all of you now. The assistance with everything before, during and after the Hamfest was just SUPER.

Again - Thanks for a job well done.

Ed, N2EH

RaRa PICNIC — JUNE 2nd POWDER MILL PARK

The Annual RaRa Picnic will take place Saturday, June 2nd at Wadhams Lodge in Powder Mill Park in Pittsford. The picnic will be from 2 - 5 p.m. and as always there will be plenty of games, fun and food. The picnic is open to all members and their family or a guest. There is no charge. The annual picnic is one of the membership benefits of RaRa. See you there!



RARA OFFICERS, DIRECTORS AND COORDINATORS

OFFICERS

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JULY RAG DEADLINE

JUNE 15, 2024

RARA MEETS AT 7PM ON THE FIRST WEDNESDAY OF EACH MONTH.

NO FORMAL MEETING IN JUNE, SEE PAGE 1

CONTACT WEBMASTER@ROCHESTERHAM.ORG FOR SUPPORT

Rochester Area Repeater Listing

THE RARA RAG

Published by

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